Qatalum site visit



January 25-26, 2010



Table of contents

Hydro – Jørgen	С.	Arentz Rostrup	
----------------	----	----------------	--

Market update – Eigil Madsen

Qatalum project – Tom Røtjer 57

Qatalum operations – Jan Arve Haugan 97

Forward-looking statements

3

38

Certain statements included within this announcement contain forwardlooking information, including, without limitation, those relating to (a) forecasts, projections and estimates, (b) statements of management's plans, objectives and strategies for Hydro, such as planned expansions, investments or other projects, (c) targeted production volumes and costs, capacities or rates, start-up costs, cost reductions and profit objectives, (d) various expectations about future developments in Hydro's markets, particularly prices, supply and demand and competition, (e) results of operations, (f) margins, (g) growth rates, (h) risk management, as well as (i) statements preceded by "expected", "scheduled", "targeted", "planned", "proposed", "intended" or similar statements.

Although we believe that the expectations reflected in such forwardlooking statements are reasonable, these forward-looking statements are based on a number of assumptions and forecasts that, by their nature, involve risk and uncertainty. Various factors could cause our actual results to differ materially from those projected in a forward-looking statement or affect the extent to which a particular projection is realized. Factors that could cause these differences include, but are not limited to: our continued ability to reposition and restructure our upstream and downstream aluminium business; changes in availability and cost of energy and raw materials; global supply and demand for aluminium and aluminium products; world economic growth, including rates of inflation and industrial production; changes in the relative value of currencies and the value of commodity contracts; trends in Hydro's key markets and competition; and legislative, regulatory and political factors.

No assurance can be given that such expectations will prove to have been correct. Hydro disclaims any obligation to update or revise any forward-looking statements, whether as a result of new information, future events or otherwise.



Hydro



Jørgen C. Arentz Rostrup, Executive Vice President and CFO



Hydro's value proposition

- Leading integrated aluminium and energy company with global reach and attractive positions across the value chain
- Upstream cost position to be improved by the world-class Qatalum smelter
- Strong operational performance and cost focus
- Financial discipline
- Long-term prospects for aluminium remain encouraging





Business model









Historic downturn in 2009

World outside China

% change YoY World ex China



Source: Global Insight / CRU / Hydro



Imbalance reduced

World outside China



Global ex China (annualized)

Source: CRU Jan 2010



Mixed signals in markets and economy









Solid measures executed in 2009





Further upstream improvements necessary

Focus on lean smelter operations and operational excellence



* Includes only fully consolidated smelters



Ambitious plan to cut cost by 100 USD/tonne

90% to be realized by end-2011 compared to 2009



Calculation based on stable assumptions for LME, currencies, raw material prices etc. Includes only fully consolidated smelters.

- Accelerated operational performance defined within Primary Metals production management system:
 - Improved current efficiency
 - Reduced power consumption
 - Reduced anode consumption
- Reduced fixed cost and lean operations



Primary Metal

Next steps in repositioning



- Implement stretch targets for cost savings and operational performance at existing assets
- Continued efforts on procurement initiatives
- Production curtailments
 - Additional curtailments if needed
 - No restarts before it makes financial and industrial sense
- New growth projects only in first quartile on cost curve
- Qatalum start-up



Metal Markets



Strategy

- Increased business volume through limited asset investments
- Optimized sourcing, casthouse operations and commercial marketing of metal products
- Primary casthouses to maximize capacity utilization by streamlining the production
- Gain leading position in scrap conversion
- Basis for strategic alliances



Extruded Products



Underlying EBITDA* NOK million



- Leading positions in Extrusion Eurasia and Building Systems
 - Strong entrepreneurial spirit, management culture and competence
 - Product quality and service excellence
 - Product innovation through strong customer relations
 - Performance management operational excellence
- Strong position in the US and Brazil
- Strategy
 - Reinforce European extrusion base
 - Specialist in energy-neutral building solutions
 - Selective acquisitions
 - Entry into new markets



*Excluding Automotive Structures

Building Systems

Our way to energy neutral & surplus buildings



- Strong multi-brand market penetration
- World wide sales organization
- High performing products
- Selective acquisitions
- Buildings of tomorrow
 - Energy saving
 - Energy gaining
 - 100% recyclable
 - Interactive with the user





Rolled Products





- Strong position in foil, litho and automotive
- Underutilization and overcapacity is an industry challenge
- Strategy
 - Margin management and cash generation
 - Focus production system on core assets
 - High grading product portfolio



Energy

Strategy

- · Expand solid captive power position
 - 0.5 1 TWh development potential
 - Utilizing existing concession areas and infrastructure
 - Investment NOK 1.2 2.5 billion from 2011 onwards
 - Normal production today 9.4 Twh
- · Long-term power sourcing at predictable cost

Reversion

- · Effects for private companies
- No renewal or new concessions
 - Can own up to 1/3 of publicly owned plants
 - · Everlasting concessions if sold to public companies
- Implications for Hydro
 - First large system to revert in 2022
 - · Financial impact muted by:
 - Public everlasting concession possibility
 - Hydro can maintain 1/3 indefinitely

Normal production capacity per region and terms



Note: public ownership implies ownership by the state or municipalities



Going forward



Upstream

Cost reduction

Midstream

• Margin management

Downstream

- Margin management
- Capture possibilities
- Cost control

Working capital management

Capital expenditures discipline



Attractive upstream growth pipeline

Qatalum 2 – aluminium smelter, Qatar CAP – alumina refinery, Brazil

- Potential for expanding Qatalum up to 1.2 million mt
- Utilize next-generation
 smelting technology, HAL4e
- Joint venture agreement between Vale (61%), Hydro (20%) and Dubal (19%)
- First stage 1.9 million mt of alumina, potential for expansions up to 7.4 million mt





- Development potential
 0.5 1 TWh
- Utilizing existing concession areas and infrastructure







Repositioning of Primary Metal



Primary aluminium production, 1 000 tonnes

* Ramp up during 2005. Full expansion of Sunndal 4 was 150 000 tonnes



Qatalum financing

Project economics

• First decile position on cash cost curve when in full operation

Qatalum financing

- USD 5.7 billion (100%)
- Equity from owners 54%
- Project financed 46%

Project financing

- Term of loan is 16.5 years from August 2007
- Installment profile adjusted for cash flow profile
- Competitive terms





Qatalum ramp-up schedule



Production in 1 000 tonnes on 100% basis, annualized





Qatalum earnings



- Build-up costs in 2009 and into 2010
- Depreciated over ~20 years
- Marginal tax implications
- At current forward prices -
 - Earnings negative in 2010
 - No dividend expected short term





Global metal sales from Qatalum in 2010

Total 340 000 tonnes: 75% products & 25% standard ingot









Cash flow neutral first nine months 2009

- Significant reductions in operating capital ~NOK 5.8 billion realized in 2009
- Capital discipline reduced investments
- No dividend payment in 2009
- Qatalum investments
 - Project financed in first half 2009
 - Equity contribution from partners in second half 2009 and 2010





Capital expenditures

12.2 ~10.2 ~5.3* 2008 2009E 2010E

Debt-financed investments in joint ventures (upstream)
 Investments Qatalum

Other

NOK billion

Sustaining capex

* Excluding net operating capital in Qatalum

- ~80% of 2009-2010 investments upstream
- Sustaining capex ~NOK 2.5-3 billion annually
- Qatalum
 - Project financed in first half 2009
 - Equity contribution in Q3 – NOK 1.5 billion
 - Equity contributions from partners and project financing in Q4
 - Equity contributions mainly from partners in 2010
- Additional prospects not included
 - Holsbru power development
 - Selective growth in Extrusion and Building Systems



Sustaining capital expenditures





Financial position



* Net interest-bearing debt in equity accounted investments, net pension liability, operating lease commitments and other



Liquidity well covered



* Excluding net operating capital

Available long-term credit facilities

- EUR 750 million in bank facility maturing in 2012
- USD 1.7 billion in multi-currency revolving facility maturing in 2014
- Currently ~NOK 16 billion undrawn

Qatalum investments

- USD 5.7 billion project costs^{*} (100%)
 - USD 2.6 billion project financed
 - USD 0.1 billion outstanding end-Q3
 - USD 3.1 billion in equity from owners
 - USD 1.2 billion remaining end-Q3



Credit quality policy

Maintain investment-grade rating

- Currently: BBB- (S&P), Baa2 (Moody's), both with negative outlook
- Competitive access to capital and important for Hydro's business model (partnerships and counterparty risk)

Financial ratios over the business cycle – Hydro's ambitions

- Funds from operations to net adjusted debt > 40%
- Net adjusted debt to equity < 0.55





Price and currency sensitivities



Aluminium price sensitivity +/- 100 USD per tonne NOK/USD sensitivity +/- 0.1 NOK



- Annual sensitivities .
- Aluminium price sensitivity is net of aluminium price indexed costs •
- NOK/USD sensitivity includes USD revenues and costs •
- Based on expected business volumes for 2010 and the following prices: ٠
 - Aluminium 1 900 USD/tonne
 - NOK/USD 5.50
- ٠ LME sensitivity excludes unrealized effects related to operational hedging
- USD sensitivity on financial items is based on financial positions end Q3 09 ٠



Shareholder policy



- Hydro aims to give shareholders competitive returns compared to alternative investments in peers
- Dividend payout ratio^{*} will average 30% over the cycle
- Buyback of shares and extraordinary dividends
 - When earnings, liquidity position and capital structure allow
- No dividend payout for 2008, but dividend policy maintained

* Dividend divided by net income


Hydro's priorities



- Reposition upstream business
- Execute Qatalum
- Proactive corrective measures
- Financial flexibility
- Stay close to customers
- Solid operations
- Competitive shareholder returns
 - Dividend policy: 30% of net income over the cycle



Aluminium market update



Eigil Madsen, Head of Portfolio Development Primary Metal



Aluminium price





Base metals price index (USD) from Jan 1, 2009





Oil vs. aluminium(USD) from Jan 1, 2009





Source: Reuters/EcoWin

Price development since December 1, 2009





LME forward curves 2006-10





Still unbalance, but at a reduced level



Global ex China (annualized)

.



Stock development



Source: Reuters/EcoWin



Apparent (un)balance demand/production outside China



HYDRO

Chinese production at all-time high

...and increasing

China (annualised per month)



Source: CRU

China Consumption

China Production



LME and Shanghai* aluminium price





Arbitrage LME vs Shanghai aluminium price





Source: Reuters/EcoWin

China: swift response to market conditions and prices Limited imports of primary metal likely in 2010

1 000 tonnes



Source: Hydro / Antaike Jaunary 2010

- Production curtailments
- Strategic government purchases lifted inland prices, import became profitable
- Government incentives increased demand in 2009
- Production increase in 2009/2010
 - Restart of curtailed capacity
 - New capacity being built
- Imports of primary aluminium expected to stay low, but also primary exports to be limited



New production from green and brownfield projects under construction is coming on stream

Accumulated new capacity World ex China, 1 000 tonnes





• ~ 1500 kT

 In addition we assume 300 kt unspecified creep by 2010, and 400 kt in 2011



Source: Hydro S&BD , Analysis 2009

Industry cost came down from 2008 to 2009, currently the cost curve is moving up





2010 balance – same view as shown at CMD

World outside China





Demand estimates world excluding China

World outside China	Demand 2009 million tonnes	Demand 2010 million tonnes	%
CRU – January Quarterly	20.4	22.3	9 %
Alcoa – 4Q presentation	21.4	22.5	5 %



Strong LME price in spite of sustained over production

- High inventory levels
 - Availability of capital at low interest rates
 - A stable contango has financed stocks that are "locked in" until Q2/Q3 2010
- Strong inflow of investment money No producers selling
- Physical ingot premiums still elevated Rusal continuing warehousing deals



Price drivers for 2010

- •High inflow of investment money
- Restocking after crisis
- •Stocks "locked" in warehouse deals
- Rising marginal cost
- •Commodities create expectations also for aluminium





Qatalum project



Tom Røtjer, Executive Vice President and Head of Projetcs



Qatalum location



Mesaieed Industrial City





Hydro history in Qatar

- Qafco 1 in 1973
- Qafco 2 in 1979
- Qafco 3 in 1997
- Qafco 4 in 2004

• Qatar Vinyl Company in 2001



Qatalum a 50/50 joint-venture company





A new dimension aluminium project



Heads of agreement Joint venture agreement Investment decision Final build decision Production start-up Ramp-up December 2004 March 2006 October 2006 July 2007 Year-end 2009 During 2010





Key reference project - Sunndal 4

- Hydro technology used in Sunndal, further developed for Qatalum
- Project execution, start-up and operations experience implemented in Qatalum
- Personnel with experience from Sunndal key in Qatalum project



Qatalum project scope





Global procurement



21 Contracts

9 GCC, 2 North America, 7 Europe, 2 Asia, 1 Australia



2007-2008 "Crunch time"

for project execution in the Gulf area





2008 appears to be the 'crunch time' for project workload in the GCC and Qatar



Implications for Qatar?

- Resources being diverted to Saudi Arabia and UAE where there is higher demand
- Lack of availability of top tier contractors and resources
- Sliding project schedules and delays

Source: Contax Market Intelligence, Oct 2007

Note: Analysis is based upon announced and awarded projects only.

©2007 Contax FZ. All Rights Reserved. Proprietary and Confidential Use of this Document is Subject to the Terms Outlined on Page 2

Slide No: 10









Qatalum site September 2007





10 million tonnes of landfill=200.000 truckloads Total driving distance ~20 million km 1500 truck loads pr day

June 2008 - piling



June 2008 - 7200 people on site and INCREASING



17 000 workers on site – January 2009




Construction village





Construction Village for 10 000 people





Health, Safety & Environment - December 2009



Total Project	Number of LTI		Medical Treatment		*	Working h	Norking hours		LTI-rate*			TRI-rate*			Total No.
			Cases		RVVC	(Constr. nouis)								Induents	
	NH	Contr.	NH	Contr.		NH	Contr.	NH	Contr.	Total	NH	Contr.	Total		Observations
Period	0	1	0	5	1	18912	3216293	0	0,3	0,3	0	2,2	2,2	4	4161
Accum	0	32	0	139	64	390 0 42	79 057 222	0	0,4	0,4	0	3,0	3,0	84	66688

Last 12 months	Number of	LTI	Medical Treatment		*	Working hours		LTI-rate*			TRI-rate*			High Risk	Total No.
			Cases		RWC	(Constr. hours)								Incidents	of HSE
	NH	Contr.	NH	Contr.		NH	Contr.	NH	Contr.	Total	NH	Contr.	Total		Observations
Period	0	1	0	5	1	18912	3 216 293	0	0,3	0,3	0	2,2	2,2	4	4161
Accum	0	19	0	89	52	241672	52 972 847	0	0,4	0,4	0	3,0	3,0	61	52713

*Man-hours from NKM Noell and Solios Carbone have not been included as the report has not yet been submitted



No. of cranes related to no. of observations





Overall progress by end December 2009: 95%







Qatalum completion : some 400.000 tags THE HYDRO WAY !!!!!!!!!









2009-10-13 potroom building and fume treatment plant







Carbon - Baking Furnace Tending Assembly



Anode Baking furnace production: 340 000 anodes per year.

Paste Plant capacity 60 tonnes/hour of green anodes



2009-10-26





2009-12-14 Silos with conveyor belt





2009-09-27

Start-up Potline 2 - December 16, 2009





Qatalum power plant

EPC- Contractor: EPC value: Power production Cap: Grid Connection: Site: GE / Doosan appr. 900 musd 1350 MW 250 MW 252.000 m²





Qatalum Power Plant Open Cycle Operation





Combined Cycle Operation









Power plant





Qatar newspapers October 5, 2009

and on budget' The first aluminium is to roll out of Qatatum before December this year

By Pratap John Chief Business Reporter

the first aluminium will roll out of Qatalum, a \$5.6bn Qatar Petroleum-Hydro joint venture, before the year-end, HE the Deputy Premier, Abdullah bin Hamad al-Attiyah announced yesterday.

Speaking to Gulf Times at the joint venture's Messieed site, al-Attiyuh said he was "delighted" at the progress made by the project so far.

"It is more than 90% complete, I can confirm that the first aluminium roll-out from our plant would be before December. We are on time and within budget," al-Attiyah said.

Qatahum is the world's largest greenfield smelter ever built in a single phase. Currently, about 20,000 people, most ly contractors' workforce, are involved in Qatalum construction.

The Mesaleed plant will focus on producing aluminium casthouse materials like extrusion ingots and primary foundry alloys.

The facilities will include a 1,350MW gas-fired captive power plant, a modern casthouse, carbon plant, and a new port for unloading raw materials.

Hydro board chairman Terge Vareberg said Qatahum would attain ca-

pacity production "within six months". The main raw material required for 585,000 tonnes of primary aluminium in a year. However, production can be ramped up at the facility to 609,000t

The smelter comprises two 1.2km long pot rooms containing 352 cells each, a casthouse which produces 350,000tpy of extrusion ingots and 275,000tpy of foundry alloys. The adjacent carbon plant will prepare and supply 300,000tpy of baked anodes and recycle 63,000toy of spent anodes. Qatalum has been designed to accommodate a further expansion

QP will provide gas to Qatalum to operate the captive power plant whose generation will be about 35% of Qatar's current power production and 10% of that of Norway.

The raw material for Qatalum is being sourced from all over the world, particularly Brazil, where Hydro has captive alumina and bandle sources.

Top priority

Qatatum considers "Quality Qutarisation" as a top priority. according to CEO Truis Gautesan. By co-operating and co-ordinating with Qatar Petroleum and educational institutions in Qatar, Qatalum was strongly committed to "national development" at all levels, he said.

Qatalum production is aluminium oxide, which is commonly referred to as alumina, said Richard Brandtzaeg, Hydro CEO.

\$5.6bn Qataluı Qatalum built plant 'on time ith an eye on

"We have raw material for the next 100 years," Brandtzaeg said.

Qatalum is deploying a patented Hydro technology, which is considered the "most productive and least polluting" in the industry, said Qatalum CEO Truis Gautesan. Called Hydro Aluminium 300 it has already got clearance from the Supreme Council for Environment and Natural Reserves (SGENR).

He said that Hydro's technology ensured greenhouse gas emissions were kept to the minimum possible Iovel.

"Qatalum is staying ahead of global industrial environmental obligations by investing in and implementing Hydro's leading edge, low environmental impact electrolysis technology. From laser guided Pot Tending Machines in the Potrooms to the state-of-the-art Pume Treatment Plant, environmental considerations are critical to the projects sustainability."

Gautesan said: "Additionally, Qatalum can credit itself with an excellent safety record. After completing 63mn man hours its Lost Time Injury is 0.4 per million work hours, far surpassing the challenging target defined by Qatalum when the project

ASIF IOBAL

DOHA Recent fluctuations in the prices of commodities should not be a cause for great concern as these are natural cycles, and before long prices would bounce back to more

with an eye on

realistic levels. This was stated by the Deputy Prime Minister and Minister of Energy and Industry HE Abdullah bin Hamad al Attiyah. He was talking to reporters during his visit to Qatar Aluminium Oatar (Qatalum)

future: Attiyah feel confident that growth will return and with it prices will make a steady recovery," Attiyah said. Things were not as bad as predicted, he added. Commenting on the status of the Qatalum plant which is scheduled to go into operation by the end of this year, the Energy Minister said even amidst the world financial crisis, aluminium has maintained a sustainable price of \$1,800 per tonne. "The plant has been built with an eye on the future, not on short-term interests. We know that alu-



Key project success factors

- Well-defined concept at time of decision
- Successful contract strategy and selection of contractors
- Interface management
- Sound risk management
- Active stakeholder management
- Strong HSE ambitions
- Project completion "The Hydro Way"



Site canteen







Qatalum operations



Jan Arve Haugan, CEO Qatalum



Qatalum



Committed to deliver...



Qatalum Operations - January 26, 2010

Background

- Organization development
- □ Start up of Operations
- Ramp up plan
- **Qatalum going forward**



One relationship + two needs = Qatalum

Background

The context in which our business will make a difference Two fundamental needs have driven Hydro and QP to further deepen their 35+ year relationship:

Qatar's need to develop a modern and more diversified society beyond a reliance on oil & gas

Hydro's need to strengthen its competitive position and long-term sustainability with low cost energy in a low cost area.



Qatalum - A 50/50 Joint Venture





A new dimension aluminium project



Heads of agreement Joint venture agreement Investment decision Final build decision Production start-up Ramp-up December 2004 March 2006 October 2006 July 2007 Year- end 2009 During 2010
















Qatalum project scope









Qatalum organization





Global Procurement



21 Contracts

9 GCC, 2 North America, 7 Europe, 2 Asia, 1 Australia



Qatalum's Global Family



Mobilization Progress





Mission, Values, Strategies and Governing Documents





	Ethics Relationships, Teamwork, Communication	Drive Efficiency, Innovation
Our	Respect	Proactive
C CI	Respect	TIOGCTIVE
Values	vve work in an open, cooperative way.	we are driven to meet optimum standard while always seeking improvement.
	Ability Competence Reliability	Attitude Motivation Seeing big picture
Beliefs that differentiate and focus our performance	Trustworthy We always keep our word and ensure the job gets done right.	Enthusiastic We have a positive attitude toward our jobs and each other.



A Comprehensive Training Program





= Supervisor/staff training

Growing international media interest with high level visits

October

2009

October 26, 2009, the first pitch vessel arrived at Qatalum's inbound dock

Anode Handling and Storage



Rodding Anodes

Dry out of Anode Baking Furnace at December 31, 2009

Qatalum Project and Management

000

Potline -1 Team ready for Start up

100



PTM Cranes at Potline 1





Cast house - Furnace

First Foundry Alloy December 04, 2009



First Export of Foundry Alloys Oatar National Day, December 18, 2009

First Extrusion Ingot January 22, 2010

1.11

Raw Material storage at Harbour Area

Critical period ahead



Qatalum - competitive cost position

Business Operating cost (USD/t)





Source: CRU, BOC 2008: LME 2834 USD/ton, USDNOK 5,16 BOC 2009: LME 1594 USD/ton, USDNOK 6,53

Qatarisation





Qatalum



Deliver as committed



www.hydro.com